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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/798,265	03/12/2004	Willi Niemerg	677/41956	5875
23646	7590	04/19/2006	EXAMINER	
BARNES & THORNBURG 750-17TH STREET NW SUITE 900 WASHINGTON, DC 20006-4675			JOERGER, KAITLIN S	
			ART UNIT	PAPER NUMBER
			3653	

DATE MAILED: 04/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/798,265	NIEMERG, WILLI	
	Examiner	Art Unit	
	Kaitlin S. Joerger	3653	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 March 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 March 2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|----------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>6/14/04</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Drawings

The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the pressure element acting on the centering ring from below the centering ring as claimed in claim 13 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112

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The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 9 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 9 recites the limitation "the ring disk" in line 2. There is insufficient antecedent basis for this limitation in the claim.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-8, 10, 12, 15, and 16 are rejected under 35 U.S.C. 102(b) as being anticipated by Krüger et al.

Krüger et al. teaches a centrifugal drum for a separator, having a vertical axis of rotation, comprising: a drum bottom part, 12, and a drum cover, 15, fastened to the drum bottom part by a locking ring, 58, and a centering ring, 16, arranged between the drum bottom part and the drum cover such that while the centering ring is be pretensioned it sealingly and centeringly braces the drum bottom part and the drum cover to one another. The drum cover engages the drum bottom part and the centering ring is arranged between an outer circumference of the drum cover and an inner circumference of the drum bottom part, the centering ring being configured such that the

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centering ring and sealing is maintained during an operation to a maximal rotational speed of the separator. The centering ring includes elastically deformable material, see figure 7b and column 2, lines 38+. An inner collar, 78, on an inner circumference of an upper ring section of the drum bottom part on which a correspondingly shaped outer collar, 76, rests and which complementarily shaped outer collar is situated on an outer circumference of a lower ring section of the drum cover, see figure 7b. The drum includes a pressure element, 52, which acts upon the centering ring from above and presses the centering ring upon a collar. The centering ring, or part of it as shown in figure 7b, is arranged above the outer collar of the drum cover. The centering ring is designed such that a centering and sealing effect of the ring is maintained to a maximal rotational speed of the separator, see brief summary section.

Claims 1, 4, 7, 9, 11, 12, 14, 16, and 17 are rejected under 35 U.S.C. 102(b) as being anticipated by Steinacker et al.

Steinacker et al. teaches a centrifugal drum for a separator, having a vertical axis of rotation, comprising: a drum bottom part, 1, and a drum cover, 2, fastened to the drum bottom part by a locking ring, 3, and a centering ring, 5, arranged between the drum bottom part and the drum cover such that while the centering ring is be pretensioned it sealingly and centeringly braces the drum bottom part and the drum cover to one another. The centering ring includes elastically deformable material, the material is rubber, see column 3, lines 4+. The drum includes a pressure element, 13, which acts upon the centering ring from above and presses the centering ring upon a collar. The pressure element is a ring disk.

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Claims 1, 7, and 13 are rejected under 35 U.S.C. 102(b) as being anticipated by Nilson et al.

Nilson et al. teaches a centrifugal drum for a separator, having a vertical axis of rotation, comprising: a drum bottom part, 1, and a drum cover, 3, fastened to the drum bottom part by a locking ring, 4, and a centering ring, 9, arranged between the drum bottom part and the drum cover such that while the centering ring is be pretensioned it sealingly and centeringly braces the drum bottom part and the drum cover to one another. The drum includes a pressure element, 5, which acts upon the centering ring from below and presses the centering ring upon a collar, 8.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The additional patents cited on the PTO-892 form are other examples of prior art that teach sealing arrangements for centrifugal separators.

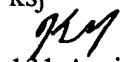
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kaitlin S. Joerger whose telephone number is 571-272-6938. The examiner can normally be reached on Monday - Friday 9-5.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eileen Lillis can be reached on 571-272-6928. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

ksj


131 April 2006

 4/17/06

DEAN J. KRAMER
PRIMARY EXAMINER